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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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10/748,991

12/29/2003

Dominick H. Salvato

1589

8249

23623

7590

10/25/2005

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EXAMINER

LE, UYEN CHAU N

ART UNIT

PAPER NUMBER

2876

DATE MAILED: 10/25/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

## Office Action Summary

Application No.

10/748,991

Applicant(s)

SALVATO, DOMINICK H.

Examiner

Uyen-Chau N. Le

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☒ Responsive to communication(s) filed on 23 September 2005.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 1-29 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-29 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
  - ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- ☐ Notice of References Cited (PTO-892)
- ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_\_
- ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_\_
- ☐ Notice of Informal Patent Application (PTO-152)
- ☐ Other: \_\_\_\_\_

**DETAILED ACTION**

***Prelim. Amdt/Amendment***

1. Receipt is acknowledged of the Amendment filed 11 October 2005.

***Claim Rejections - 35 USC § 103***

2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

3. Claims 1-3, 7-12, 15-16, 19, 21-26 and 29 remain rejected under 35 U.S.C. 103(a) as being unpatentable over Kfoury et al (US 2003/0044000) in view of Kumar (US 5,386,106 - cited by the Applicant).

Re claims 1-3, 7-11, 15-16, 19, 21, 23-25 and 29: Kfoury et al discloses a system that facilitates desirable orientation of a display on an electronic device (e.g., cell phone 100), comprising: a keypad 102 that is moveable with

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respect to a body of the electronic device 100, the keypad 102 utilized to relay information to the electronic device 100; a component 504 that senses a position of the keypad 102; and a component 500 that orients the display 104 based at least in part upon the sensed position of the keypad 102 (figs. 1-5; paragraphs [0016-0021]; a detachable face 601, the keypad 102 and the display 104 resident upon the detachable face 601; and a component that senses a position of the detachable face, the display oriented at least in part upon the sensed position of the detachable face (fig. 6; paragraph [0022]); one or more keys 106 that are employed to enter information into the electronic device 100, the one or more keys not moveable with respect to the body of the electronic device, and operability of the one or more keys depending upon the sense position of the keypad (paragraph [0030]); a multi-position connector that facilitates connecting the keypad to the body of the electronic device, the position of the keypad sensed via monitoring a physical connection between the keypad and the multi-position connector; a sensing component that dynamically senses a position of the keypad, the display dynamically rendered based at least in part upon the sensed position of the

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keypad (paragraphs [0034-0036]; the keypad detachable from the electronic device 100 (fig. 6); a mechanism 704 that locks the keypad in a desirable position (fig. 11; paragraph [0032])).

Kfoury et al is silent with respect to the electronic device is a machine data reader including a wearable barcode scanner.

Kumar teaches a portable device 10 having barcode scanner module 70 (figs. 1 & 6).

It would have been obvious to an artisan of ordinary skill in the art at the time the invention was made to further employ the barcode scanner module of Kumar into the portable device as taught by Kfoury et al in order to provide Kfoury et al with a universal system which can be utilized in various applications. Furthermore, such modification would have been obvious to an artisan of ordinary skill in the art for intended use, and therefore an obvious expedient.

Re claims 12, 22 and 26: Kfoury et al discloses each time the keypad is locked (i.e., by detent 704 and recess 706) at a new position resulting from a rotation, the processor 500 remap the key sensors 1306 to the new

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orientation of the keys 1304, this is accomplished by using lookup tables (paragraphs [0032] and [0035]). Therefore, it is understood that if the keypad is not yet locked at the new position (i.e., not yet completed a rotation of either  $90^{\circ}$  or  $180^{\circ}$ , etc.), the processor 500 will not performing the remapping process, and thus the keypad is not operated (i.e., inoperative).

4. Claims 4-5 and 20 remain rejected under 35 U.S.C. 103(a) as being unpatentable over Kfoury et al as modified by Kumar as applied to claims 1 and 15 above, and further in view of Charlier et al (US 2003/0064751). The teachings of Kfoury et al as modified by Kumar have been discussed above.

Re claims 4-5 and 20: Kfoury et al/Kumar has been discussed above but is silent with respect to a customization component that facilitates user-customization of a display rendering based at least in part upon the sensed position of the keypad, the customization component customizes size of at least one of text and imagery of the display, respectively.

Charlier et al teaches a portable electronic device 116 having a user interface 108 for customizing the display

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rendering based at least in part upon the sensed position of the keypad (fig. 5; paragraphs [0026-0027]).

It would have been obvious to an artisan of ordinary skill in the art at the time the invention was made to incorporate a user interface for customizing the display as taught by Charlier et al into the system of Kfoury et al/Kumar in order to provide the user with the flexibility to customize the display to a desirable configuration with respect to the position of the keypad, thus providing a more user-friendly system.

5. Claims 6, 13-14, 17-18 and 27-28 remain rejected under 35 U.S.C. 103(a) as being unpatentable over Kfoury et al as modified by Kumar as applied to claims 1, 15 and 23 above, and further in view of Knox (US 6,004,049). The teachings of Kfoury et al as modified by Kumar have been discussed above.

Re claims 6, 13-14, 17-18 and 27-28: Kfoury et al/Kumar has been discussed above but is silent with respect to the electronic device is an IC card reader; customizing means for customizing for customizing the orientation of the display based at least in part upon user identification, user history, and current application; a data store that

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contains one or more profiles, the profiles relates to individual users and comprising information related to user references, and the display oriented based at least in part upon a profile; respectively.

Knox teaches a computer 101 having a card reader 134 for reading a smart card 135; a memory (NVAM) 128 for storing customized keyboard/display layout (figs. 1 and 3; col. 3, line 14 through col. 4, line 62 and col. 6, line 10 through col. 6, line 56).

It would have been obvious to an artisan of ordinary skill in the art at the time the invention was made to incorporate the teachings of Knox into the system as taught by Kfoury et al/Kumar in order to provide the user with a storage device for storing customized keyboard/display layout, which would reduce time and labor (i.e., the user does not have to concern about re-due the configuring/customizing of the keyboard/display every time using the system), and therefore an obvious expedient.

#### ***Response to Arguments***

6. Applicant's arguments filed 11 October 2005 have been fully considered but they are not persuasive. The prior art

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made of record and not relied upon is considered pertinent to applicant's disclosure.

7. In response to applicant's argument that the examiner's conclusion of obviousness is based upon improper hindsight reasoning, it must be recognized that any judgment on obviousness is in a sense necessarily a reconstruction based upon hindsight reasoning. But so long as it takes into account only knowledge which was within the level of ordinary skill at the time the claimed invention was made, and does not include knowledge gleaned only from the applicant's disclosure, such a reconstruction is proper. See *In re McLaughlin*, 443 F.2d 1392, 170 USPQ 209 (CCPA 1971).

8. In response to applicant's argument that there is no suggestion to combine the references, the examiner recognizes that obviousness can only be established by combining or modifying the teachings of the prior art to produce the claimed invention where there is some teaching, suggestion, or motivation to do so found either in the references themselves or in the knowledge generally available to one of ordinary skill in the art. See *In re Fine*, 837 F.2d 1071, 5 USPQ2d 1596 (Fed. Cir. 1988) and *In re*

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*Jones*, 958 F.2d 347, 21 USPQ2d 1941 (Fed. Cir. 1992). In this case, the primary reference to Kfoury et al discloses an electronic device having a rotatable keypad and display, wherein the keypad is physically rotatable and the display is electronically rotatable display image. A sensor provides a sensor signal representative of the orientation of the keypad, wherein the keypad has at least first, second, and third orientations (paragraphs [0015-0017]). Kfoury is silent with respect to the portable reader is a machine data reader. The secondary to Kumar teaches a portable device having a housing with a barcode scanner module disposed therein (fig. 2 and abstract, lines 8+). It would have been obvious to an artisan of ordinary skill in the art at the time the invention was made to further employ the barcode scanner module of Kumar into the portable device of Kfoury for intended use. Furthermore, the portable device of Kfoury and the portable device of Kumar are both electronic devices, it would have been obvious to an artisan of ordinary skill in the art at the time the invention was made to either incorporate the barcode reading module of Kumar into the portable device of Kfoury or the rotatable keypad of Kfoury into the portable device of Kumar for

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intended use. Accordingly, the claimed limitation, given the broadest reasonable interpretation, Kfoury in view of Kumar meets the claimed invention (see the rejection above).

For the reasons stated above, the Examiner believes that a proper prima-facie case of obviousness has been established. Therefore, the Examiner has made this Office Action final.

#### **Conclusion**

9. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for

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reply expire later than SIX MONTHS from the mailing date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Uyen-Chau N. Le whose telephone number is 571-272-2397. The examiner can normally be reached on First Monday 5:30AM-1:30PM and Tues-Fri 5:30AM-3PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Michael G. Lee can be reached on 571-272-2398. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

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A handwritten signature in black ink, appearing to read 'Uyen-Chau N. Le', with a long horizontal flourish extending to the right.

Uyen-Chau N. Le

Examiner

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October 21, 2005